

Coal Search Corporation
P.O. Box V
Salina, Utah 84654
Phone (801) 529-7402



October 15, 1980

Mr. Thomas J. Suchoski
State of Utah
Department of Natural Resources
Division of Oil, Gas, and Mining
1588 West North Temple
Salt Lake City, UT 84116

RECEIVED

OCT 17 1980

DIVISION OF
OIL, GAS & MINING

RE: Exploration Drilling

Dear Tom:

Enclosed are:

1. Proof of surface owner permission
2. Archaeological clearance for drill site
3. BLM Coal Exploration License (copy)

The BLM Coal Exploration License has highlighted the seeding mixture and the procedure for cementing the drill holes. We will use the same methods for the drill holes on fee coal.

Please contact me by telephone as per the status of our request.

Sincerely,

Tom Hurst

Tom Hurst
Sr. Mining Engineer

jpb
Enclosures

Coal Search Corporation
P.O. Box V
Salina, Utah 84654
Phone (801) 529-7402



September 26, 1980

Mr. Bill Nielsen
Mr. Rodger Nielsen
18 West 200 North
Salina, Ut 84654

Dear Bill and Rodger:

Coal Search will agree to furnish the items listed in this letter in order to drill one exploratory drill hole on your property and five drill holes on the National Forest property east of your ranch (see attached map). This agreement will allow Coal Search all rights of access to perform all exploration and reclamation activities in regard to this program. These activities include ~~but are not limited to:~~ *DTM*
normal traffic of heavy equipment, light vehicles, drilling rigs, *REM.*
water trucks and other support equipment, reclamation activities, surveying, and on-going monitoring of the drill sites.

*1980
DTM
RE-M.*
In consideration for these activities, Coal Search will provide:

1. Rehabilitation of the stock pond dam which has washed out. This project will entail earth moving from adjacent areas to fill void in dam. Compaction of material will be by dozer or front-end loader. No additional material will be trucked in.

If this letter of agreement is satisfactory, please sign and return.

Sincerely,

Tom Hurst
Sr. Mining Engineer

jpb

Accepted:

Bill Nielsen

Rodger Nielsen

*No Firewood will be removed. DTM
RE-M.*



Museum of Northern Arizona

August 20, 1980

Mr. Tom Hurst
Coal Search Corporation
P.O. Box V
Salina, UT 84654

Dear Mr. Hurst:

Enclosed is the final report for the archaeological survey of six drill hole locations and access road on Old Woman Plateau.

If you have any questions about the report please feel free to contact me at your convenience.

Sincerely,

Donald E. Weaver, Jr.
Director
Archaeological Contract Section

DEW/ljs

Enclosure

MUSEUM OF NORTHERN ARIZONA
DEPARTMENT OF ANTHROPOLOGY

ARCHAEOLOGICAL INVESTIGATIONS

COAL SEARCH, INC.

PRIVATE AND PUBLIC LANDS

RICHFIELD DISTRICT, FISHLAKE NATIONAL FOREST

SEVIER COUNTY, UTAH

Final Report

for

An Archaeological Survey of 6 Proposed
Coal Exploration Drill Hole and Access Road
Locations, Old Woman Plateau,
Fishlake National Forest, Utah

A-80-43

United States Forest Service
Special Use Permit

Prepared by:

Donald R. Keller
Supervisory Archaeologist

Submitted by:

Donald E. Weaver, Jr.

August 20, 1980

ABSTRACT: Six coal exploration drill hole locations and associated access roads were surveyed for archaeological resources by the Museum of Northern Arizona for Coal Search Corporation. The survey, conducted in August of 1980 on the Old Woman Plateau east of Salina, Utah, found no sites. Archaeological clearance for the project locations is recommended.

INTRODUCTION

On August 5, 1980, the Museum of Northern Arizona (MNA) conducted archaeological investigations of 6 proposed coal exploration drill hole locations and their access roads on the Old Woman Plateau, a part of the Wasatch Plateau east of Salina, Utah. One drill hole and access road set (No. 1, Table 1 and Figure 1) is located on private land. The remaining five (No. 2-6) are located on lands administered by the United States Forest Service, Fishlake National Forest, Richfield District. Fieldwork was conducted under provisions of a Special Use Permit, a Class D-4 Cultural Resources Permit, issued by the Richfield District Office of the Fishlake National Forest. Archaeological investigations were performed by Donald R. Keller, Supervisory Archaeologist, MNA. The project was administered by Donald E. Weaver, Jr., Director of the Archaeological Contract Section, MNA. The investigations were originally requested by letter of July 7, 1980, by Tom Hurst, Senior Mining Engineer, Coal Search Inc.

The survey alignments are located in level to moderately sloping plateau top area between 8150 and 8450 ft in elevation. Common plant species in the survey area are sagebrush, various grasses, mahogany, pinyon and ponderosa pine, juniper, oak, Douglas fir and spruce. Topographically, the area is located on a point on the eastern edge of the Old Woman Plateau having relatively indirect and difficult access.

ARCHAEOLOGICAL INVESTIGATIONS

Previous MNA investigations in the general project area have been conducted by Dulaney (1979) and Hunt (1975, 1976a and b). No sites were recorded during these investigations.

The National Register of Historic Places has been consulted, and no sites or districts on the register occurred in the area to be affected by the proposed drilling activities. Site files at MNA and Fishlake National Forest were also consulted and no sites in the immediate project area have been previously recorded. However, site files of the Utah Historical Society contain records of two archaeological sites in

Table 1. Drill Hole and Access Road Archaeological Clearance Recommendations

| Drill Hole No. | Location (T23N R4E) | Archaeological Clearance | |
|-------------------|---|--------------------------|---------------------------|
| | | Drill Pad (80 ft radius) | Access Road (50 ft width) |
| 1 | Sec. 27, SE $\frac{1}{4}$ of SE $\frac{1}{4}$ of SE $\frac{1}{4}$ | Recommended | Recommended (existing) |
| 2 | 26, SE $\frac{1}{4}$ of SE $\frac{1}{4}$ of SW $\frac{1}{4}$ | Recommended | Recommended |
| 3 | 26, SE $\frac{1}{4}$ of SE $\frac{1}{4}$ of NW $\frac{1}{4}$ | Recommended | Recommended |
| 4 | 26, SW $\frac{1}{4}$ of SE $\frac{1}{4}$ of NE $\frac{1}{4}$ | Recommended | Recommended |
| 5 | 26, NE $\frac{1}{4}$ of SE $\frac{1}{4}$ of SE $\frac{1}{4}$ | Recommended | Recommended |
| 6 | 35, NW $\frac{1}{4}$ of SE $\frac{1}{4}$ of NE $\frac{1}{4}$ | Recommended | Recommended |

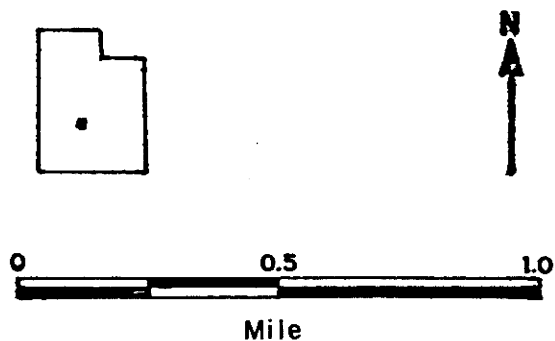
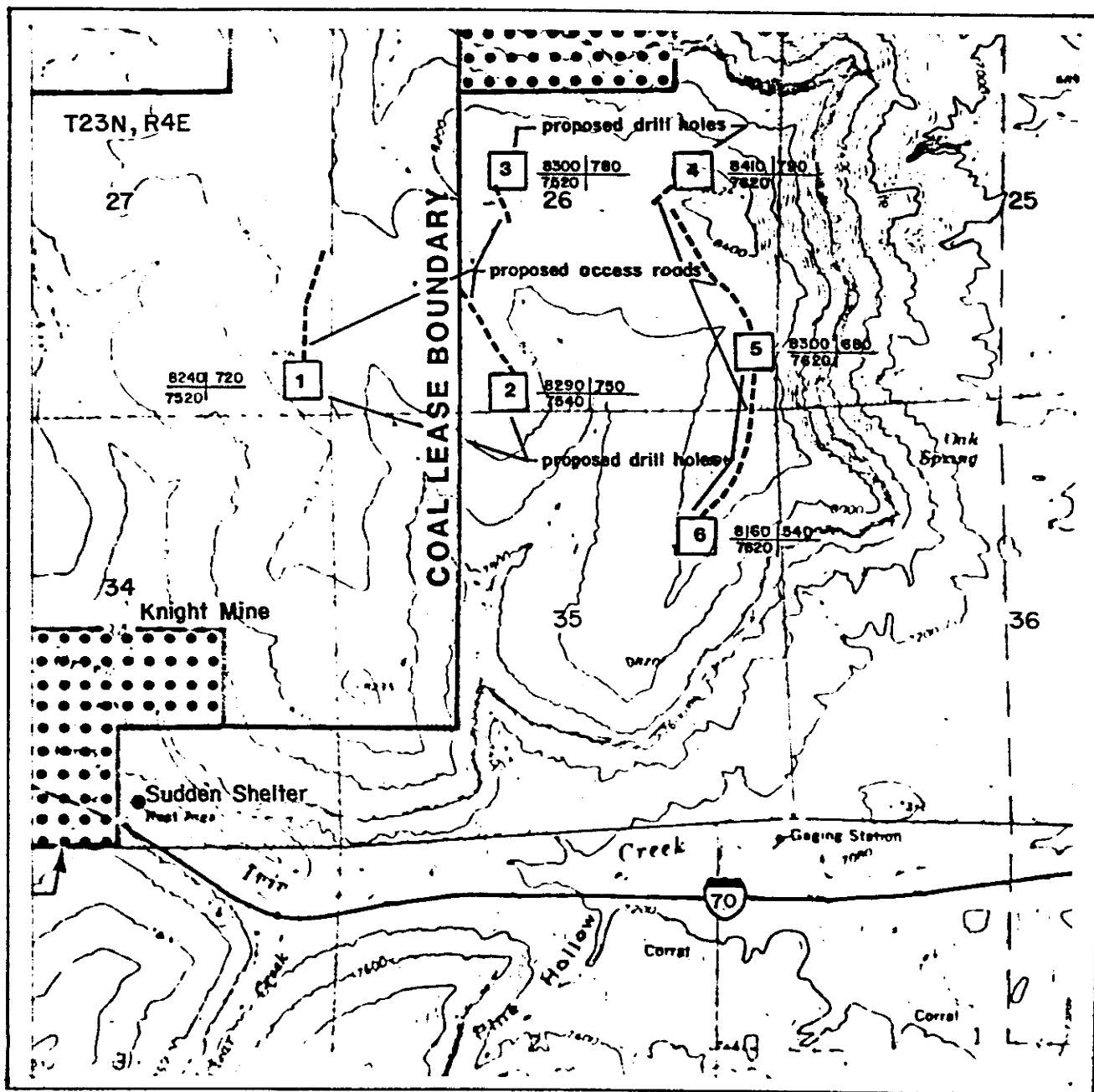


Figure 1. Proposed drill hole and access road locations.

the SE $\frac{1}{4}$ of Section 34, T23S, R4E. These were 42SV991, a site destroyed by the construction of Interstate 70, and 42SV6 ("Sudden Shelter", Jennings, Schroedl and Holmer n.d.), a site of masonry ruins immediately adjacent to Interstate 70. The area of these sites will not be impacted by the proposed construction.

The drill hole and access road locations had been flagged prior to the survey. During the survey the areas of the access roads and drill hole pads were walked by the archaeologist accompanied by Hurst. Full visual coverage was made of the expected impact areas and immediately adjacent areas of the proposed drilling program, as specified in Table 1. A total of 11.9 acres were surveyed, including the six drill hole locations, each with an 80 ft radius, and approximately 1.5 miles total length of 50 ft wide access roads. No collection of artifacts was done during the survey.

RESULTS AND RECOMMENDATIONS

No archaeological sites were found during the survey. One isolated white chert core was found at drill location 5, and one isolated white chert projectile point fragment was found near location 2. The piece appeared to be a fragment of a medium-sized triangular side-notched point. It was too incomplete, however, to be typologically useful. The point does indicate that hunting was an activity carried out prehistorically on the Old Woman Plateau (See Simms 1979 for a discussion of the part played by high altitude areas in prehistoric subsistence cycles in the Fishlake Forest region). No other artifactual material was seen during the survey.

Archaeological clearance for the proposed drill holes and associated access roads is recommended. Location-specific recommendations are given in Table 1. In the event that unexpected buried cultural remains are encountered during any project activities, work at that particular location should be halted until an evaluation can be made by the Forest Archaeologist, Fishlake National Forest.

REFERENCES CITED

Dulaney, Alan R.

- 1979 Final report for an archaeological survey of a proposed microwave passive reflector site and access road, Fishlake National Forest, Utah. Ms, Museum of Northern Arizona, Flagstaff.

Hunt, Roy D.

- 1975 Final report for archaeological clearance investigations for 16 proposed drill hole locations (Fishlake National Forest). Ms, Museum of Northern Arizona, Flagstaff.
- 1976a Final report for archaeological clearance investigations on ten proposed drilling locations and associated access routes (Fishlake National Forest). Ms, Museum of Northern Arizona, Flagstaff.
- 1976b Final report for archaeological survey of the proposed Skumpah Canyon mine portal and related facilities (Sevier County, Utah). Ms, Museum of Northern Arizona, Flagstaff.

Jennings, Jesse D., Alan R. Schroedl and Richard N. Holmer

- n.d. Sudden shelter. University of Utah Anthropological Papers (Ms, in preparation).

Simms, Steven R.

- 1979 High altitude archaeology in Utah: a cultural resource inventory of 11 projects and a test excavation in the Fishlake National Forest. Ms, Department of Anthropology, University of Utah.

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

COAL EXPLORATION LICENSE

Serial Number U-45918

Issue Date _____

Expiration Date _____

This license, entered into on _____, by the United States of America, the licensor, through the Bureau of Land Management (BLM), and

Coal Search Corporation
P. O. Box 87
Salina, Utah 84654

the licensee, is hereby issued under the Mineral Leasing Act of February 25, 1920, 41 Stat. 437, as amended (30 U.S.C. Sections 181-263), and is subject to all applicable Federal, state, and local laws and regulations including, but not limited to, 43 CFR Group 3400, and 30 CFR Part 211.

Sec. 1. RIGHTS UNDER LICENSE. This license confers the right to perform exploration operations in accordance with the terms and conditions of this license, the approved exploration plan, and applicable regulations in the following-described lands situated in Emery and Sevier Counties, Utah:

T. 23 S., R. 4 E., SLM, Utah
Sec. 26, S $\frac{1}{2}$ NE $\frac{1}{4}$, SE $\frac{1}{4}$ NW $\frac{1}{4}$, E $\frac{1}{2}$ SW $\frac{1}{4}$, SE $\frac{1}{4}$;
Sec. 35, NE $\frac{1}{4}$, E $\frac{1}{2}$ NW $\frac{1}{4}$, N $\frac{1}{2}$ SE $\frac{1}{4}$.

Containing 680 acres.

This license is for a period of two years, is not subject to extension or assignment, and shall confer no right to lease.

The issuance of this license shall not preclude the issuance of a coal lease under applicable regulations for the above-described lands. If a coal lease is issued, the lands embraced in such lease shall be eliminated from the license effective upon the date of issuance of such lease. A licensee may not remove for sale any coal from the deposits subject to his license, but he may remove a reasonable amount of coal for analysis and study.

Sec. 2. EXPLORATION. The licensee shall diligently explore the lands by drilling, excavating or by geophysical or geochemical surveying or other acceptable methods. The licensee is entitled to use for exploration purposes so much of the surface of the licensed lands as is reasonably necessary for such operations in accordance with the approved exploration plan which is attached and made a part of this license.

Sec. 3. OPERATIONS. (a) Licensee shall comply with all regulations of the Secretary of the Interior and with all regulations and orders of the Secretary of Agriculture.

(b) Licensee shall comply with the provisions of the operating regulations of the Geological Survey (30 CFR Part 211) and all orders issued pursuant thereto. Copies of the operating regulations may be obtained from the Geological Survey, Area Mining Supervisor, hereafter called the Mining Supervisor.

(c) Licensee shall allow inspection of the premises and operations by duly authorized representatives of the Departments of the Interior, Agriculture, or other agency administering the lands, and shall provide for the free ingress or egress of Government officers and for users of the lands under authority of the United States.

Sec. 4. MULTIPLE USE. (a) The Government reserves the right to authorize other uses of the licensed lands by regulation or by issuing, in addition to this license, leases, licenses, permits, easements, or rights-of-way, including leases for the development of minerals other than coal under the Act. The Government may authorize any other uses of the licensed lands that do not unreasonably interfere with the exploration operations of the licensee, and the licensee shall make all reasonable efforts to avoid interference with such authorized uses.

(b) The Government reserves the right: (i) to sell or otherwise dispose of the surface of the licensed lands under existing law or laws hereafter enacted insofar as such disposal will not interfere with the rights of the licensee, or (ii) to dispose of any resource in such lands if such disposal will not unreasonably interfere with the exploration operations of the licensee.

(c) If the licensed lands have been or shall hereafter be disposed of under laws reserving to the United States the deposits of coal therein, the licensee shall comply with all conditions as are or may hereafter be provided by the laws and regulations reserving such coal.

Sec. 5. PROTECTION OF SURFACE, NATURAL RESOURCES, AND IMPROVEMENTS. The licensee agrees to take such reasonable steps as may be needed to prevent operations on the licensed lands from unnecessarily:

(a) causing or contributing to soil erosion or crop damage, including forage, and timber growth on the licensed lands or on Federal or non-Federal lands in the vicinity;

(b) polluting air and water; and

(c) damaging improvements owned by the United States or other parties.

Upon any partial or total relinquishment or the cancellation or expiration of this license, or at any other time prior thereto, when required, and to the extent deemed necessary, by the licensor to fill and reclaim any pits, ditches and other excavations, remove all debris, and so far as reasonably possible, restore the surface of the licensed lands and access roads to their former condition, including the removal of structures as and if required. The licensor may prescribe the steps to be taken and restoration to be made with respect to the licensed lands and improvements thereon whether or not owned by the United States.

Sec. 6. RELINQUISHMENT OF LICENSE. The licensee may relinquish this license, in whole or part, by filing in the proper BLM office a written relinquishment which shall be effective as of the date it is filed, subject to the continued obligation of licensee and his surety to comply with the terms and conditions and special stipulations of the license, the exploration plan, and the regulations, and, to provide for the preservation of any permanent improvements on the licensed land.

Sec. 7. REVOCATION OF LICENSE. This license may be revoked for noncompliance with the terms and conditions of the license, the exploration plan, or the regulations, after the licensee has been notified of such violation in writing and the licensee has failed to correct the violation within the period prescribed by such notice.

Sec. 8. MODIFICATION OF LICENSE. ~~When unforeseen conditions~~ that could result in substantial disturbance to the natural land surface or damage to the environment or improvements are encountered, or where geologic or other physical conditions warrant a modification, the authorized officer, after consultation with the Mining Supervisor, and where appropriate, the surface management agency, may modify the license or adjust the terms and conditions of the exploration license; or the Mining Supervisor, after consultation with the authorized officer, and where appropriate the surface management agency, may direct adjustment in the exploration plan.

Sec. 9. EQUAL OPPORTUNITY CLAUSE. This license is subject to the provisions of Executive Order No. 11246 of September 24, 1965, as amended, which sets forth the nondiscrimination clauses.

Sec. 10. CULTURAL RESOURCES. (a) The Authorized Officer may require a survey of all or part of the licensed lands to provide an inventory of any historical, cultural and archaeological values. The survey shall be conducted by a qualified professional archaeologist, approved by the Authorized Officer, and a report of the survey shall be submitted to the Authorized Officer. The exploration operations may be conditioned on the approval of the survey report and the approval of measures to protect the historical, cultural and archaeological values. The cost of any survey or measures to protect such values discovered as a result of the survey shall be borne by the licensee and items and features of historical, cultural, or archaeological value shall remain under the jurisdiction of the United States.

(b) If any items or features of historical, cultural or archaeological value are discovered during exploration operations, the licensee shall immediately notify the Mining Supervisor and the Forest Supervisor and shall not disturb such items or features until the Mining Supervisor and the Forest Supervisor issue instructions. If the licensee is ordered to take measures to protect any items or features of historical, cultural or archaeological value discovered during exploration operations, the cost of the measures shall be borne by the licensor and such items and features shall remain under the jurisdiction of the United States. The Government will evaluate such discoveries and appropriate mitigating measures not later than 10 working days after notification.

Sec. 11. USE OF DATA. The licensee shall furnish to the Mining Supervisor copies of all data (including but not limited to, ~~geological, geophysical, and core drilling analyses~~) obtained during exploration. The licensee shall submit such data and, where appropriate, the methods by which the data were gathered, at such time and in such form as required by the Mining Supervisor. The Confidentiality of all data so obtained shall be maintained until after the areas involved have been leased or until such time as the Mining Supervisor determines that making the data available to the public would not damage the competitive position of the licensee, whichever comes first. 30 CFR 211.6; 43 CFR 2.20. The applicant may be required to collect and report ground water data to the Authorized Officer.

Sec. 12. UNLAWFUL INTEREST. No member of, or Delegate to Congress, or Resident Commissioner, after his election or appointment, either before or after he has qualified and during his continuance in office, and no officer, or employee of the Department of the Interior, except as provided in 43 CFR 7.4(a)(3), shall hold any share or part in this license or derive any benefit therefrom. The provisions of Section 3741 of the Revised Statutes, as amended, 41 U.S.C. Section 22, and the Act of June 25, 1948, 62 Stat. 702, as amended, 18 U.S.C. Sections 431-433, relating to contracts enter into and form a part of this license insofar as they may be applicable.

Sec. 13. BOND. The licensee shall file with the appropriate BLM office a compliance bond in the amount of \$10,000 to ensure compliance with the terms and conditions of the license and regulations. Where the surface of the land being explored is in private ownership, the authorized officer shall not terminate the period of liability under the compliance bond until he has received written acknowledgement from the surface owner of his satisfaction with the reclamation of the surface. In the event the licensee and surface owners are unable to reach agreement on the adequacy of the reclamation, the authorized officer shall make the final determination. He will terminate the period of liability under the compliance bond after determining that the terms and conditions and special stipulations of the license, the approved plan, and the regulations have been met.

Sec. 14. SPECIAL STIPULATIONS. The addresses of the Area Mining Supervisor and the Forest Supervisor are as follows:

Area Mining Supervisor, Conservation Division, Geological Survey, 2040 Administration Building, 1745 West 1700 South, Salt Lake City, Utah 84104

Forest Supervisor, Fishlake National Forest, 170 North Main, Richfield, Utah 84701.

1. The Area Mining Supervisor and District Ranger, Forest Service, must be contacted prior to entering into the field to conduct exploration activities. Each drill site will be approved in advance of drilling by the forest officer in charge.
2. All soil disturbance must be stabilized.
3. All vehicles will be restricted to existing roads or jeep trails unless otherwise specified by the forest officer in charge.
4. Travel on existing roads will be restricted during inclement weather to prevent rutting of the road.
5. No new road construction is allowed.
6. Any improvement of existing roads or jeep trails must have approval of the forest officer in charge.
7. Mud pits are to be fenced until rehabilitated to prevent livestock and big game from becoming mired in the mud.
8. All campsites will be approved by the forest officer in charge.
9. No water will be used from stock ponds or troughs for the drilling operation.
10. Roads will not be blocked by drilling equipment.
11. Trash created by the operation or camps will be hauled to an approved disposal site.
12. Consultation with appropriate State and Forest Service personnel for underground water monitoring will be done by the Area Mining Supervisor, Geological Survey, to insure surface rehabilitation is properly done following the monitoring program.
13. All internal combustion engines will be equipped with appropriate mufflers and spark arrestors.
14. Once drilling is completed and the site is to be abandoned, the Area Mining Supervisor, after consultation with the Forest Supervisor will acknowledge in writing to the licensee that the site has been properly rehabilitated and may be abandoned.

15. When drilling is completed the and mud pits are dry, each drill site must immediately be returned to the original contour, and the topsoil respread evenly over the entire disturbed area and reseeded with the following mixture:

| | |
|-----------------------------|------------------|
| Crested Wheatgrass | 2 lbs. per acre |
| Mountain Brome | 2 lbs. per acre |
| Western Wheat | 4 lbs. per acre |
| Timothy | 2 lbs. per acre |
| Kentucky Bluegrass | 4 lbs. per acre |
| Ladab Alfalfa (innoculated) | 3 lbs. per acre |
| Clover | 3 lbs. per acre |
| | 20 lbs. per acre |

16. When artesian flows or water horizons with possible development potential are encountered, the Area Mining Supervisor shall be notified immediately so that a determination can be made by the Forest Supervisor concerning their development potential. Where possible, clean water samples shall be collected by the operator for analysis by the Geological Survey. All aquifers encountered during drilling will be documented as to depth and flow quantity estimates.

17. Drill holes shall be cemented with proper slurry from the bottom to the collar. The licensee shall be responsible for the proper plugging of each hole unless a written request to keep the hole open is made by the Area Mining Supervisor. If drill holes cannot be fully cemented, due to sloughing, fractures, or other reasons, the Area Mining Supervisor must be notified, and his instructions for subsequent plugging followed.

18. The slurry shall be made using 5.2-5.5 gallons of water per bag of cement. The drill stem shall be lowered to the bottom of the hole and sufficient slurry pumped through the stem to fill 200 feet of the hole. The drill stem will then be raised 200 feet and the process repeated. The drill hole shall be completely plugged using this method.

19. The Area Mining Supervisor shall be notified as to the time when the first hole is to be plugged so that a representative of that office can arrange to observe the procedure if circumstances permit. Subsequent observations of other holes being plugged will be arranged as deemed necessary.

20. The hole location is to be marked by placing an approved marker such as a capped pipe, steel fencepost, or metal plate in the concrete plug. Such markers are to show hole number, year drilled, licensee name, and as feasible, the section, township, and range in which the hole is located. Top of concrete plug, if located in cultivated field, must be set below normal plow depth (10 to 12 inches).

21. Mud pits must be backfilled and leveled. Liquids or mud in the pits must be pumped out and removed from the premises or allowed to dry before they are backfilled.

22. Drill sites must be cleaned and all material, including drill cuttings, foreign to the natural setting, must be buried or removed. Trash will be removed from the area. Revegetation of the disturbed area will generally be required. If excavation is required in preparing a drill site, topsoil will be stockpiled separately. Before the drill site is permanently abandoned, the location will be regraded to a natural contour and the topsoil redistributed. Type, method, and scheduling of revegetation will be specified by the surface management agency.

23. All coal horizons encountered by this program containing seams thicker than two feet shall be logged.

24. Core samples will be obtained for all coal seams thicker than four feet from representative holes.

25. If Coal Search Corporation does not intend to secure a complete physical and chemical analysis, they shall furnish a core split from at least one representative drill site to the District Geologist, Geological Survey for analysis.

26. The Area Mining Supervisor shall be notified as to the anticipated completion date of the program.

27. A monthly report shall be submitted to the Area Mining Supervisor within 10 days after the end of the month. It will include:

- (a) The holes completed during the month and the total depth of each hole.
- (b) The date each hole was completed.
- (c) The date each hole was plugged.
- (d) The type of drilling-plug or core.

28. The following reports shall be submitted to the Area Mining Supervisor in duplicate after completion of the program:

- (a) Hydrologic logs using the attached form.
- (b) Geophysical and lithologic logs and all geologic interpretations of each log.
- (c) Coal analysis.
- (d) Total acreage of surface disturbed per hole, including acreage disturbed by access roads.

NOTE: All information submitted must contain the license number. All logs must contain the surface elevation of drill hole and the location of the drill site. The sites will be located using coordinates and/or measured distances from the nearest section line.

Attached to this license and made a part hereof is a map showing the drill hole locations and the exploration plan approved by the Geological Survey on September 16, 1980.

Coal Search Corporation

Leon J. Mayhew
(Signature of Licensee)

Vice President & General Manager
(Title)

September 22, 1980
(Date)

The United States of America

(Signature of Licensor)

(Title)

(Date)